

Date: Monday, 5/1/2006 4:00:07 PM
 User: Kim Johnston

Process Sheet

Customer	: CU-DAR001 Dart Helicopters Services	Drawing Name	: BAR
Job Number	: 26889		
Estimate Number	: 10389		
P.O. Number	: N/A	Part Number	: D31964
This Issue	: 5/1/2006	Drawing Number	: D3196 REV A
Prsht Rev.	: NC	Project Number	: N/A
First Issue	: N/A	Drawing Revision	: A
Previous Run	: N/A	Material	: N/A
Written By	: <u>See Comment Below</u>	Due Date	: 5/10/2006
Checked & Approved By	: <u>06-05-02</u>	Qty:	12 Um: Each
Comment	: Est Rev: A New Issue 05-11-08 JLM		

Additional Product

Job Number:



Seq. #:	Machine Or Operation:	Description :
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1.0	M6061T6B0750X01500	6061-T6 Bar .75" X 1.5"
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Comment: Qty.: 3.0345 f(s)/Unit Total: 36.4140 f(s)

Material: 6061-T6/T651 (QQ-A-200/8) or (QQ-A-225/8)
 (M6061T6B0.750x01.500)

Identify for D3196-4

Batch: M10094.7/8pcs

M18571/1pcs M101000/1pc
M18453/1pcs

M15031/1pcs J.F. 06/05/16

12

2.0	BAND SAW	BAND SAW
-----	----------	----------



Comment: BAND SAW

Cut blank: (0.75" x 1.50") x 34.750" long Bar

J.F. 06/05/16

12

3.0	HAAS1	HAAS CNC VERTICAL MACHINING #1
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Comment: HAAS CNC VERTICAL MACHINING #1

1-Machine D3196-4 as per Folio FA339 and Dwg D3196 Identify as D3196-4

2-Deburr

9ml/J.F. 06/05/17

12

4.0	QC2	INSPECT PARTS AS THEY COME OFF MACHINE
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Comment: INSPECT PARTS AS THEY COME OFF MACHINE

9ml/J.F. 06/05/17

12

5.0	QC8	SECOND CHECK
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Comment: SECOND CHECK


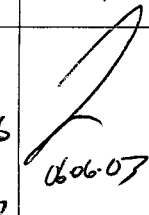
BC

06-05-31

12

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes ☒ No ☐ DQA: ☒ Date: 26/05/03
 QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			
06/05/03	1	Engraving is too deep. - 2 parts affected	CP 06.05.26 per QS1042	Engraving tool raised to proper height PARTS ARE ACCEPTABLE PER ATTACHED EMAIL	JF 26.05.16	 06.06.03	CP 06.05.26 per QS1042	 06.06.03

NOTE: Date & initial all entries

Date: Monday, 5/1/2006 4:00:07 PM
User: Kim Johnston

Process Sheet

Customer: CU-DAR001 Dart Helicopters Services

Drawing Name: BAR

Job Number: 26889

Part Number: D31964

Job Number:



Seq. #:

Machine Or Operation:

Description :

6.0

HAND FINISHING1

HAND FINISHING RESOURCE #1



Comment: HAND FINISHING RESOURCE #1

Chemical Conversion Coat as per QSI 005 4.1

a.m 06-06-01

(12)

7.0

POWDER COATING

POWDER COATING



Comment: POWDER COATING

Powder Coat Grey Sandtex (Ref: 4.3.5.6) as per QSI 005 4.3

DL 06/06/01

(12)

8.0

QC3

INSPECT POWDER COAT/CHEMICAL CONVERSION



Comment: INSPECT POWDER COAT/CHEMICAL CONVERSION

a.m 06-06-01

12

9.0

PACKAGING 1

PACKAGING RESOURCE #1



Comment: PACKAGING RESOURCE #1

Identify and Stock

Location: *2T136*

JB 06/06/01

(12)

10.0

DC

DOCUMENT CONTROL



Comment: DOCUMENT CONTROL

Inspection Level 21

Job Completion



u 06-06-02

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

DART AEROSPACE LTD		Work Order:	26889
Description: Bar		Part Number:	D3196-4
Inspection Dwg: D3196 Rev: A		Page 1 of 1	

FIRST ARTICLE INSPECTION CHECKLIST

☒ First Article ☐ Prototype

Drawing Dimension	Tolerance	Actual Dimension	Accept	Reject	Method of Inspection	Comments
34.625	+/-0.010	34.625"	/			
33.650	+/-0.010	—	/			
16.639	+/-0.010	—	/			
0.488	+/-0.010	.488"	/			
0.962	+/-0.005	.963"	/			
0.464	+/-0.010	.467"	/			
0.504	+/-0.010	.505"	/			
Ø0.344	+0.005/-0.000	Ø.348"	/			
Ø0.660 x 100°	+/-0.010	Ø.670"	/			
0.512	+/-0.005	.510"	/			
0.060 x 45°	+/-0.010	.060" x 45°	/			
4.750	+/-0.010	4.748"	/			
12.531	+/-0.010	—				
16.627	+/-0.010	—				
21.844	+/-0.010	—				
29.625	+/-0.010	—				
0.250	+/-0.010	.251"	/			
1.000	+/-0.010	1.002"	/			
R0.125	+/-0.010	R0.125"	/			
0.987	+/-0.010	.989"	/			

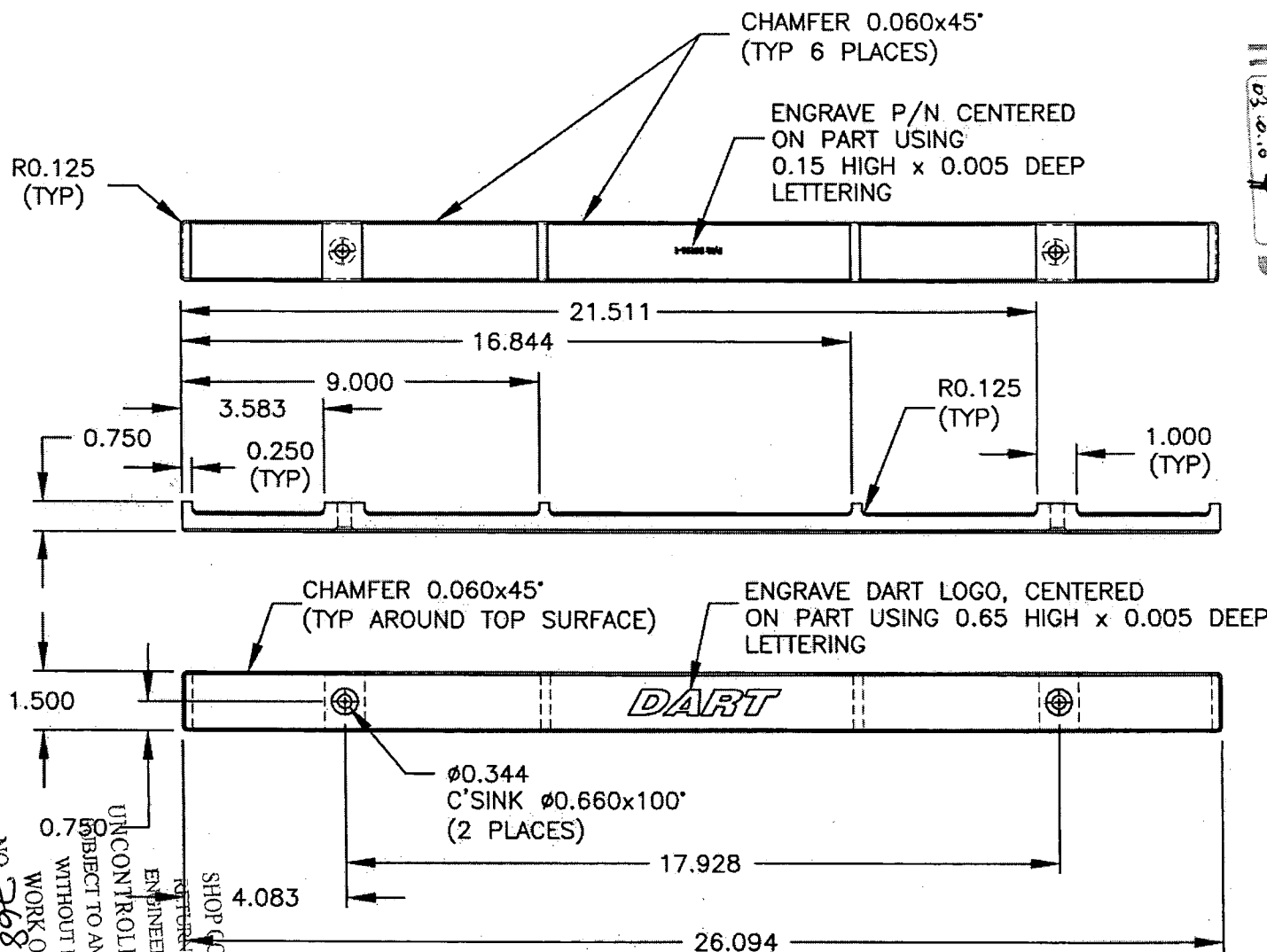
Measured by: J.F.	Audited by: SD	Prototype Approval:	N/A
Date: 06/05/17	Date: 06.05.17	Date:	N/A

Rev	Date	Change	Revised by	Approved
A	04.04.20	New Issue (P/O D412-702-011/-017)	KJ/RF	TF



RELEASED
03.06.25

DESIGN	01	DRAWN BY	01	DART AEROSPACE LTD
CHECKED	01	APPROVED	01	HAWKESBURY, ONTARIO, CANADA
DATE	03.06.25	DRAWING NO.	D3196	REV. A
		TITLE	BAR	SHEET 1 OF 3
				SCALE
A		03.06.25	NEW ISSUE	1:4



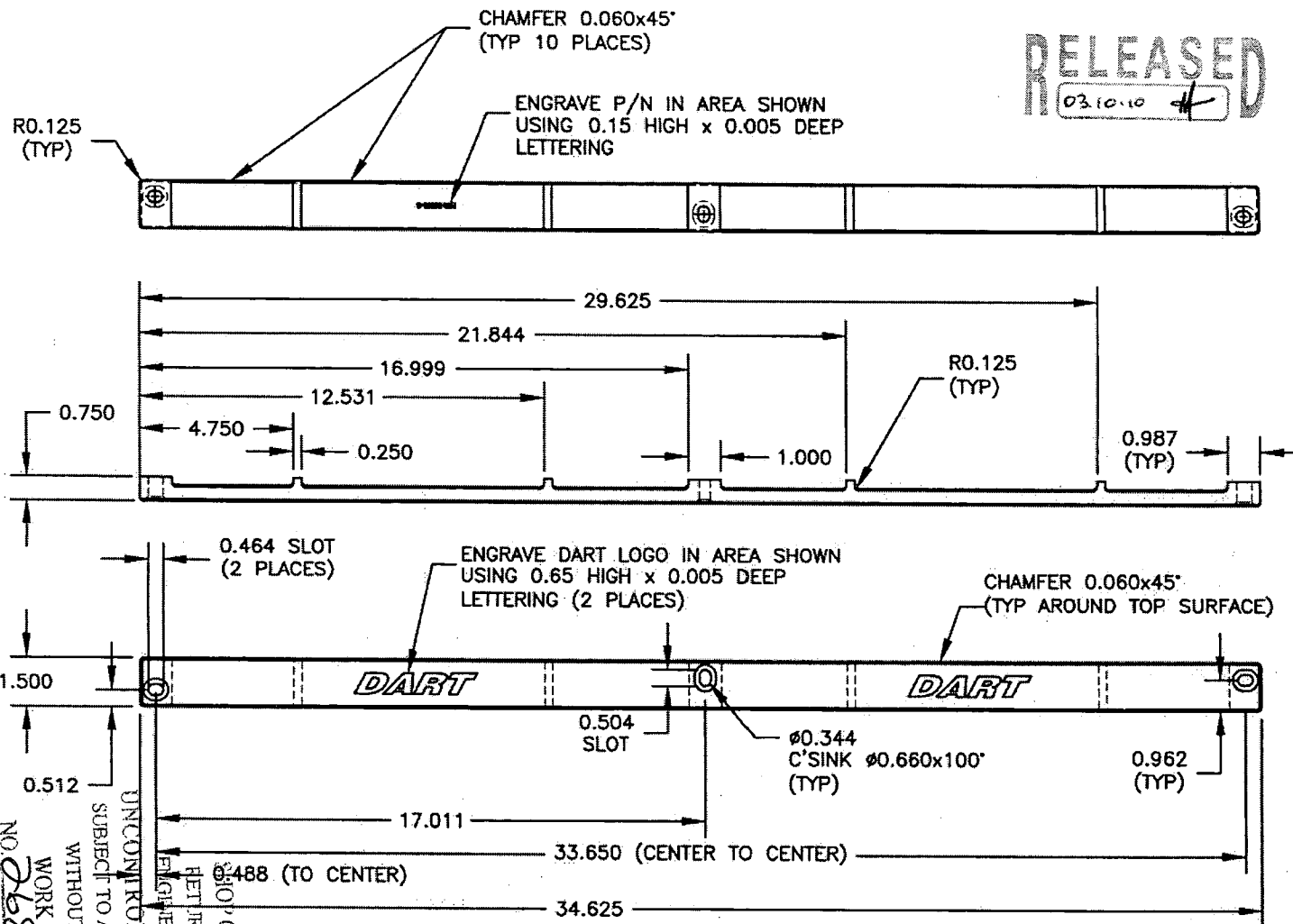
- 1) MATERIAL: 6061-T6/T651 ALUMINUM (QQ-A-200/8 OR QQ-A-225/8) (REF DART SPEC. M6061T6B)
- 2) BREAK ALL SHARP EDGES 0.005 TO 0.010
- 3) FINISH: POWDER COAT GREY SANDTEX (4.3.5.6) PER DART QSI 005 4.3
- 4) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED
- 5) ALL DIMENSIONS ARE IN INCHES

RELEASED
03.10.10

DART

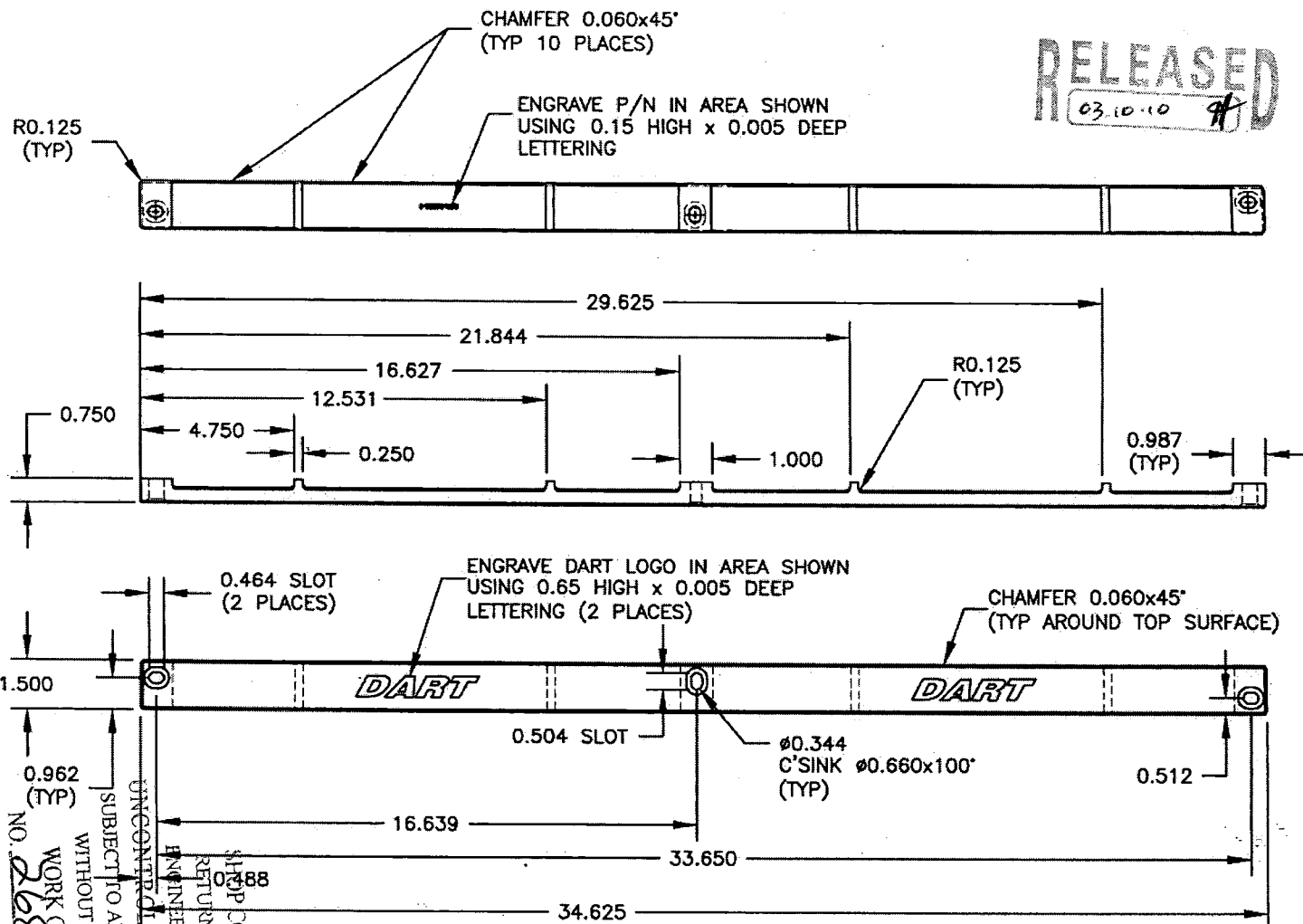


DESIGN	03	DRAWN BY	03	DART AEROSPACE LTD HAMKESBURY, ONTARIO, CANADA
CHECKED	03	APPROVED	03	
DATE	03.06.25	TITLE	BAR	
DRAWING NO.	D3196	REV. A	SHEET 2 OF 3	
SCALE	1:5			



- D3196-3
- 1) MATERIAL: 6061-T6/T651 ALUMINUM (QQ-A-200/8 OR QQ-A-225/8) (REF DART SPEC. M6061T6B)
 - 2) BREAK ALL SHARP EDGES 0.005 TO 0.010
 - 3) FINISH: POWDER COAT GREY SANDTEX (4.3.5.6) PER DART QSI 005 4.3
 - 4) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED
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D3196-4 BAR

- 1) MATERIAL: 6061-T6/T651 ALUMINUM (QQ-A-200/8 OR QQ-A-225/8)
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DART



DESIGN	DRAWN BY	DART AEROSPACE LTD HAMKESBURT, ONTARIO, CANADA
CHECKED	APPROVED	REV. A
DATE	DRAWING NO.	SHEET 3 OF 3
03.06.25	D3196	SCALE
	TITLE	1:5
	BAR	

Chris Provencal

From: David Shepherd [davids@dartaero.com]
Sent: May 26, 2006 3:59 PM
To: Chris Provencal
Subject: Re: D3196-4 NCR

Acceptable deviation

David

----- Original Message -----

From: "Chris Provencal" <cprovencal@dartaero.com>
To: "David Shepherd (E-mail)" <davids@dartaero.com>
Sent: Tuesday, May 23, 2006 8:08 AM
Subject: D3196-4 NCR

> David,
>
> The side bar for the shoulder harness, D3196-4 Bar. On qty(2), the
> engraving is 0.025" deep instead of 0.005". The thickness of parts are
all
> nominal, over 0.750". The margin of safety for the bar in bending is
0.46,
> so I don't see a problem with the engineering aspect. Bill and Serge are
OK
> with the fact the logo will look different when paired with a -3.
>
>
> Sincerely,
> Chris Provencal
> DART Aerospace Ltd.
> Email..cprovencal@dartaero.com
> Phone...613-632-3336
> Fax.....613-632-4443
>
>

